

Approved for use through 07/31/2006. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Substitute for form 1449/PTO

(Use as many sheets as necessary)

Sheet	1	of	3
-------	---	----	---

Application Number	10/789,493
Filing Date	02-27-2004
First Named Inventor	LEONHARTSBERGER
Art Unit	1652
Examiner Name	
Attorney Docket Number	LEONHARTSBERGER

[illegible]

FOREIGN PATENT DOCUMENTS						
Examiner Initials*	Cite No. ¹	Foreign Patent Document	Publication Date	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear	T ²
		Country Code ³ Number ⁴ Kind Code ⁵ (If known)	MM-DD-YYYY			
		WO-03/008591-A1	01-30-2003	Bio Holdings Co.		
		GB-1 436 509	05-19-1976	Ajinomoto Co.		
		JP-2000-139471-A	05-23-2000	Ajinomoto Co.		
		DE-102 49 642-A	05-13-2004	Consortium		
		DE-102 47 437-A	04-29-2004	Consortium		
		EP-0 647 712-A1	04-12-1995	Boehringer Ingelheim		

**Examiner
Signature**

Date	
Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. ¹ Applicant's unique citation designation number (optional). ² See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. ³ Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). ⁴ For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁵ Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. ⁶ Applicant is to place a check mark here if English language Translation is attached.

Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 (1-800-786-9199) and select option 2.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449/PTO INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Use as many sheets as necessary)		Complete if Known	
		Application Number	10/789,493
		Filing Date	02-27-2004
		First Named Inventor	LEONHARTSBERGER
		Art Unit	1652
		Examiner Name	
Sheet 2	of 3	Attorney Docket Number LEONHARTSBERGER	

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		SCHLENK ET AL., DEPALMA ET AL.: "The formation of S-Adenosylmethionine in Yeast", J. Biol. Chem., 1957, Pages 1037 - 1050.	
		SHIOZAKI ET AL.: "S-Adenosyl-L-methionine Production by Saccharomyces sake: Optimization of the Culture Conditions for the Production of Cells with a High S-Adenosyl-L-methionine Content", Agric. Biol. Chem., 1989, Pages 3269 - 3274, Vol. 53, No. 12.	
		GREENE ET AL.: "Biosynthesis of Methionine" in: Neidhardt F.C., "Escherichia coli and Salmonella typhimurium, Cellular and Molecular Biology", ASM Press, 1996, Pages 542 - 560, 2nd Edition, Washington D.C.	
		MARKHAM ET AL.: "S-Adenosylmethionine Synthetase from Escherichia coli", Journal of Biological Chemistry, 1980, Pages 9082 - 9092, Vol. 255, No. 19.	
		PARK ET AL.: "Enzymatic Synthesis of S-Adenosyl-L-methionine on the Preparative Scale", Bioorganic & Medicinal Chemistry, 1996, Pages 2179 - 2185, Vol. 4, No. 12.	
		LU ET AL., MARKHAM ET AL.: The Journal of Biological Chemistry, 2002, Pages 16624 - 16631, Vol. 277, No. 19.	
		MATO ET AL.: "S-Adenosylmethionine Synthesis: Molecular Mechanisms and Clinical Implications", Pharmacol. Ther., 1997, Pages 265 - 280, Vol. 73, No. 3.	
		ODEN ET AL., CLARKE ET AL.: "S-Adenosyl-L-methionine Synthetase from Human Erythrocytes: Role in the Regulation of Cellular S-Adenosylmethionine Levels", Biochemistry, 1983, Pages 2978 - 2986, Vol. 22.	
		ALVAREZ ET AL.: "Expression of rat liver S-adenosylmethionine synthetase in Escherichia coli results in two active oligomeric forms", Biochem. J., 1994, Pages 557 - 561.	
		FÜRSTE ET AL.: "Molecular cloning of the plasmid RP4 primase region in a multi-host-range tacP expression vector", Gene, 1986, Pages 119 - 131, Vol. 48.	

Examiner Signature	Date Considered
--------------------	-----------------

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

1 Applicant's unique citation designation number (optional). 2 Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 (1-800-786-9199) and select option 2.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT <i>(Use as many sheets as necessary)</i>		Complete if Known	
		Application Number	10/789,493
		Filing Date	02-27-2004
		First Named Inventor	LEONHARTSBERGER
		Art Unit	1652
		Examiner Name	
Sheet 3 of 3	Attorney Docket Number	LEONHARTSBERGER	

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		Derwent abstract corresponding to DE 102 49 642.	
		Derwent abstract corresponding to DE 102 47 437.	
		Derwent abstract corresponding to JP 2000-139471.	
		Chemical Abstracts 138: 281907.	
		Chemical Abstracts 138: 286121.	
		Chemical Abstracts 135: 287538.	

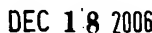
Examiner Signature		Date Considered	
--------------------	--	-----------------	--

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹ Applicant's unique citation designation number (optional). ² Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 (1-800-786-9199) and select option 2.



Approved for use through 07/31/2006. OMB 0651-0031

U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449/PTO

(Use as many sheets as necessary)

Complete if Known

Application Number	10/789,493
Filing Date	02-27-2004
First Named Inventor	LEONHARTSBERGER
Art Unit	1652
Examiner Name	
Attorney Docket Number	LEONHARTSBERGER

Sheet	1	of	2
-------	---	----	---

U. S. PATENT DOCUMENTS

[illegible]

FOREIGN PATENT DOCUMENTS

FOREIGN PATENT DOCUMENTS						
Examiner Initials*	Cite No. ¹	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear	T ²
		Country Code ³ -Number ⁴ -Kind Code ⁵ (if known)				
		EP-0 647 712-A1	04-12-1995	Boehringer Ingelheim		
		JP-63-279798	11-16-1988	Kyowa Hakko Kogyo		

**Examiner
Signature**

Date
Considered

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to be entered. ¹ Applicant's unique citation designation number (optional). ² See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. ³ Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). ⁴ For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁵ Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. ⁶ Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 (1-800-786-9199) and select option 2.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449/PTO INFORMATION DISCLOSURE STATEMENT BY APPLICANT <i>(Use as many sheets as necessary)</i>		Complete if Known	
		Application Number	10/789,493
		Filing Date	02-27-2004
		First Named Inventor	LEONHARTSBERGER
		Art Unit	1652
		Examiner Name	
Sheet 2	of 2	Attorney Docket Number	LEONHARTSBERGER

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		Derwent abstract corresponding to JP 63-279798.	

Examiner Signature		Date Considered	
--------------------	--	-----------------	--

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

1 Applicant's unique citation designation number (optional). 2 Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 (1-800-786-9199) and select option 2.